

AMENDMENTS TO THE SPECIFICATION

Please replace the paragraph starting on page 8, line 18, with “Referring now to Fig. 9,...” and ending on page 9, line 5-6 with “Data for each macroblock rasterscan also may be encoded in parallel.”, with the following amended paragraph:

Referring now to Fig. 9, an example process for writing such a bitstream for an image, using the example data structures of Figs. 1-6, will now be described. In this example, it is assumed that data is compressed and decoded in order by macroblock rasterscan. That is, each macroblock is encoded in order as they occur along a macroblock rasterscan, and the macroblock rasterscans are encoded in order as they occur in the image. The writing process involves, for each image scan, initializing (90) the data structures for the picture header, image frame descriptor and the image scan index. The number of entries, the number of lines per macroblock rasterscan and the size of the image scan index can be known and set in these data structures before compression of the image begins. As each macroblock is compressed and written into the image scan bitstream, the offset of the first macroblock of the first macroblock rasterscan is stored (92) as an entry in the image scan index. The sizes of the macroblocks are accumulated (94) for all macroblocks in the macroblock rasterscan. After all macroblocks in the macroblock rasterscan have been written, the accumulated size is rounded (96) up to the nearest data boundary (for example, a multiple of 4096 or 4K). The difference between the accumulated size and the rounded size is an amount of padding added (98) to the end of the data for the macroblock rasterscan that is written into the bitstream of the image scan. Steps 92 through 98 are repeated, as indicated at ~~100~~ 99, for each macroblock rasterscan in the image. Data for each macroblock rasterscan also may be encoded in parallel.

AMENDMENTS TO THE DRAWINGS

The attached three sheets of drawings include changes to Figs. 4, 5 and 9. These sheets, which include Figs. 4, 5-6 and 9, replace the original sheets including Figs. 4-6 and 9. In Figure 4, previously omitted reference number 46 has been added. In Figure 5, previously omitted reference number 58 has been added.

Attachments: Annotated Sheets Showing Changes
Replacement Sheets